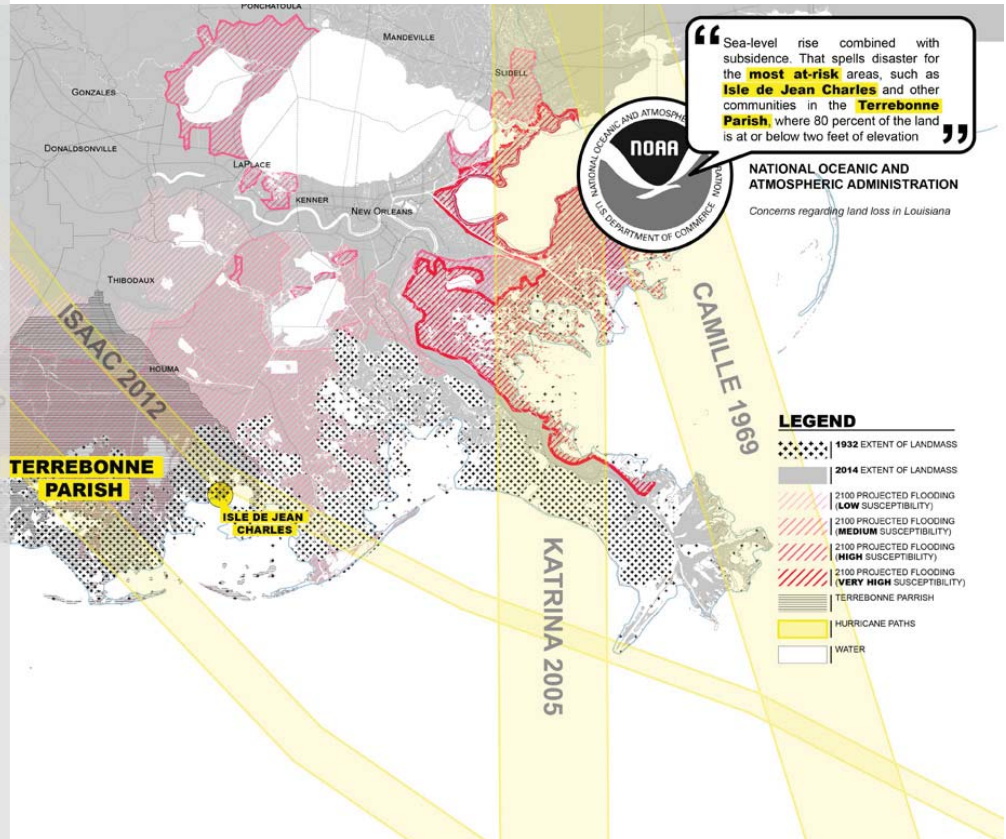


FLOATING HOPE PRESERVING AN INDIGENOUS COMMUNITY

Holcim Awards for Sustainable Construction
Elizabeth English, Steven Chodorowsky, Karan Manchanda, Jaliya Fonseka, Mark Tam, Amal Dirie, Kevin Park

The native American Biloxi-Chitimacha-Choctaw Band of Isle de Jean Charles, Louisiana, is rapidly losing their low-lying traditional homeland as sea level rises and land subsides due to extensive sub-surface oil and gas extraction. Cultural ties to the land and lack of resources to relocate as a community leave the remaining band members vulnerable to an ever-growing risk of flooding. By implementing cost-effective, flexible amphibious retrofits to the community, a safe, affordable, continued living space could be secured for the at-risk member of Isle de Jean Charles.

Nineteen of the band's twenty-six residences remaining on the island are already elevated; our solution targets the remaining seven low-lying structures. We propose retrofitting these homes with amphibious foundations to allow them to float safely when flooding occurs. The island is inadequately protected by its ring levee and is positioned outside of an authorized new levee alignment. This combination of factors threatens to overwhelm the island, its houses, and its remaining inhabitants.

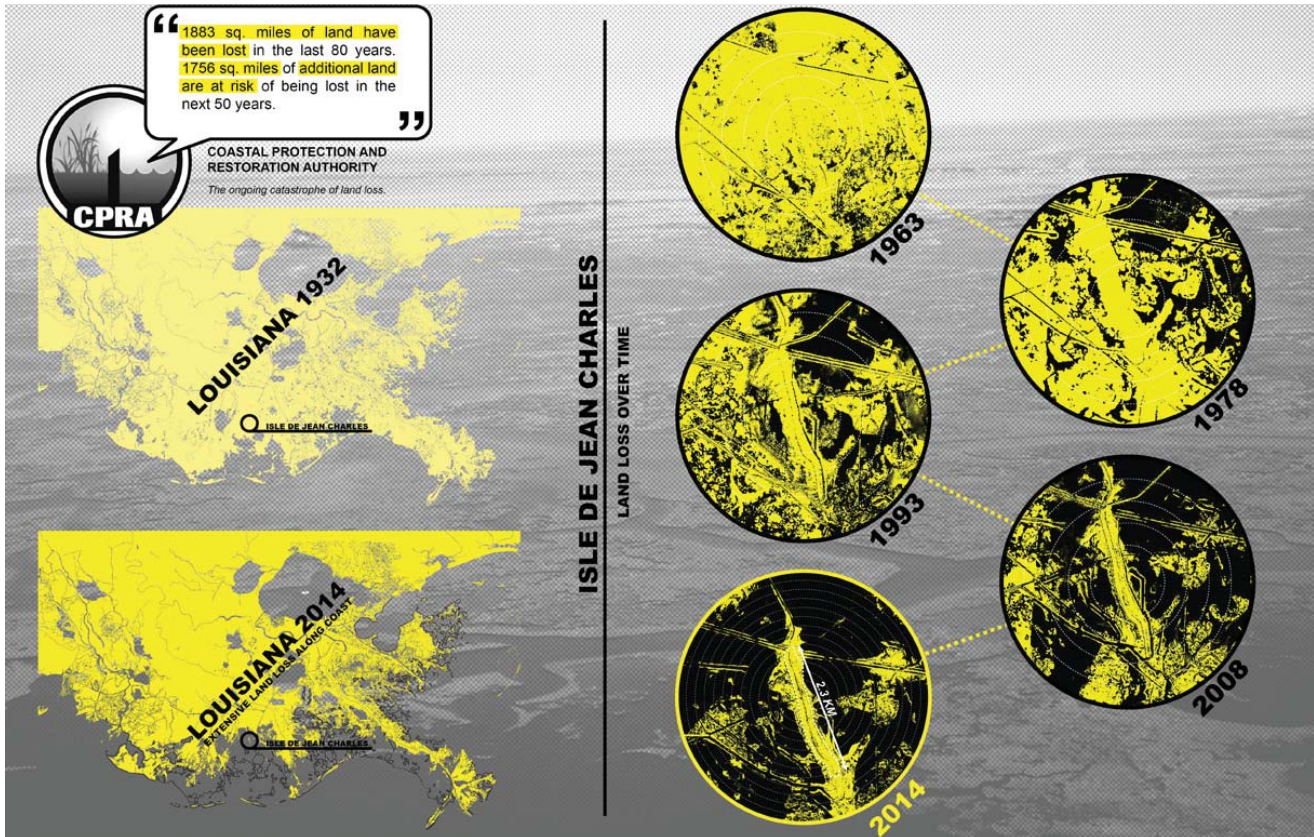


FLOATING HOPE

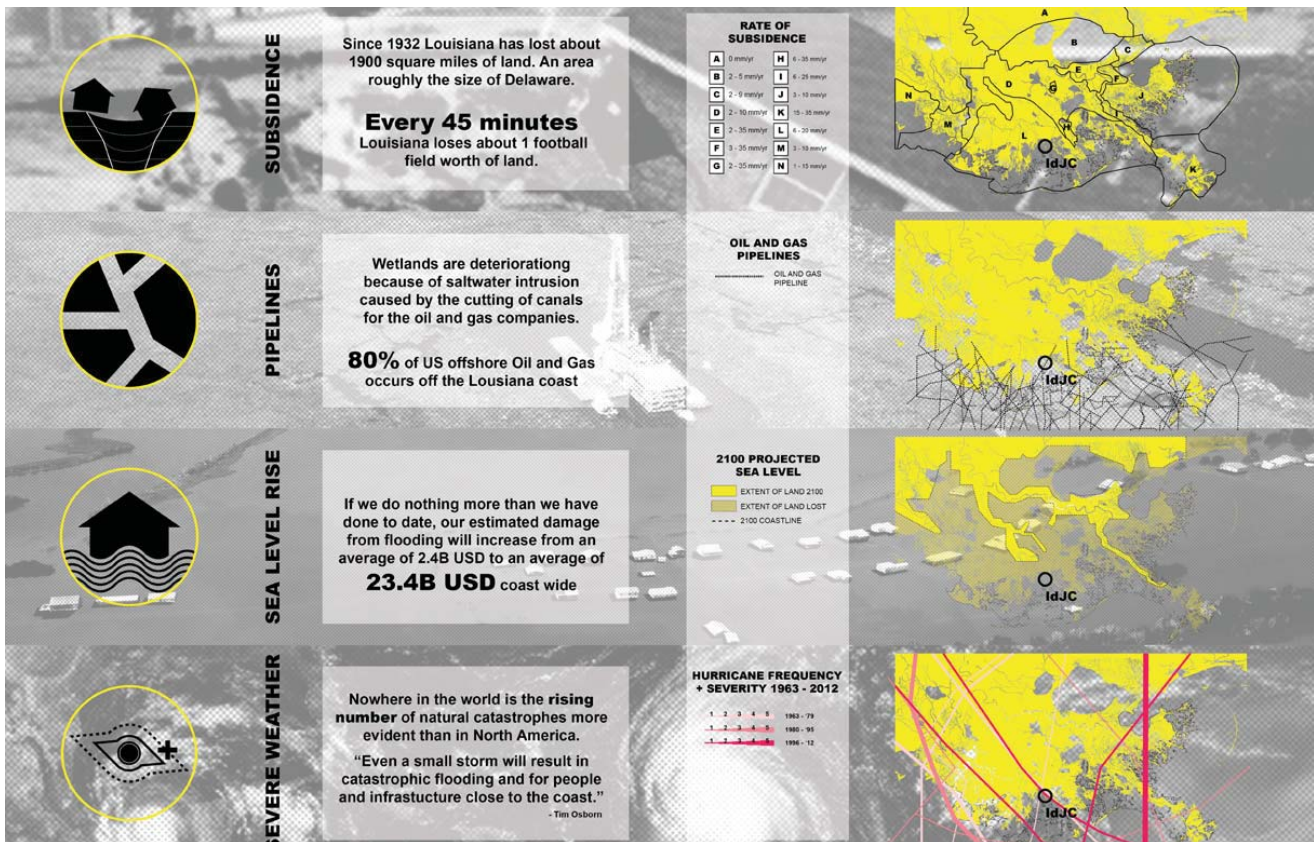


Putting it Together: Equipping the remaining low-to-the-ground homes with amphibious technology would provide a sustainable way to continue to inhabit this flood-prone area, and can help maintain a tight-knit community and its cultural practices and values. Retrofit of houses in a culturally appropriate fashion will bring a sense of normalcy to a community facing an uncertain future.

FLOATING HOPE



FLOATING HOPE



FLOATING HOPE

“ IF WE MOVE TOGETHER AS A WHOLE, WE HAVE A CHANCE TO START GROWING AGAIN. BUT IF THEY STAY, EVERY TIME THERE’S A STORM, EVERYONE’S GOING TO BE SCATTERED ”

“ LOSING THE COMMUNITIES WOULD MEAN THE END OF AN ENTIRE LIFESTYLE AND, IN THIS CASE, THE END OF AN ENTIRE PEOPLE. WHERE ARE WE GOING TO GO? HERE, WE ARE AT HOME ”

“ ISLAND IS NOT FOR SALE. IF YOU DON’T LIKE THE ISLAND, STAY OFF. DON’T GIVE UP, FIGHT FOR YOUR RIGHTS. IT’S WORTH SAVING. ”

“ BUT IF I LIVE ON THE COAST AND I CAN’T GET FLOOD INSURANCE, THEN I CAN’T GET A MORTGAGE. IF I OWN A HOUSE, I CAN’T SELL IT. SO I’M IN A HOUSE THAT I CAN’T SELL, I CAN’T AFFORD AND I CAN’T INSURE. ”

“ BEING NATIVE AMERICAN, IT’S NOT LIKE IT’S PASSIVE. IT’S VERY MUCH HOME. THIS LAND MAY NOT BE WORTH MUCH IN VALUE, BUT THIS LAND HAS FED OUR PEOPLE. THIS LAND HAS GIVEN TO US, AND WE ARE STILL HERE. THIS LAND MAY NOT BE MUCH, BUT THIS LAND IS OURS. ”

“ IN MY LIFETIME, I HAVE WITNESSED A THRIVING COMMUNITY AND CULTURE REDUCED TO A SMALL COMMUNITY ON LIFE SUPPORT. - REGEE DUPRE ”

ISLE DE JEAN CHARLES
ISLE DE JEAN CHARLES

FLOATING HOPE

LEGEND

- RETROFIT
- CURB-TH HOUSE CONSTRUCTION
- PHOTO TYPE HOUSE
- AMPHIBIOUS COMPONENT
- SUBJECT HOUSE

CASIMIRO BRUNET
LEVIS DARDAR
TERESA HENSON
DOMINIK DARDAR
BERNARDETTE MAQUIN
GILLES DARDAR
TANFANE BROUSSARD

ISLE DE JEAN CHARLES
ISLE DE JEAN CHARLES

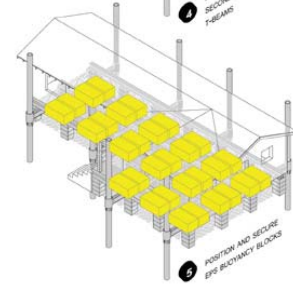
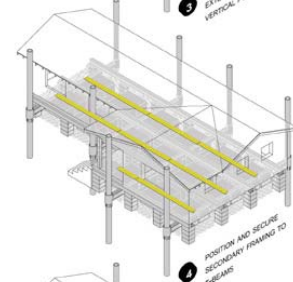
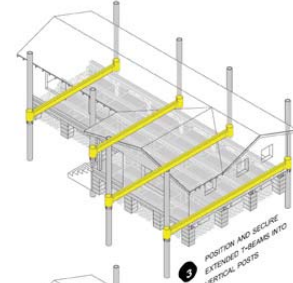
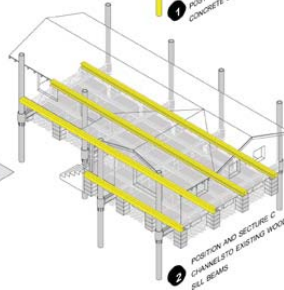
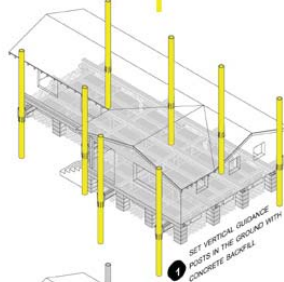
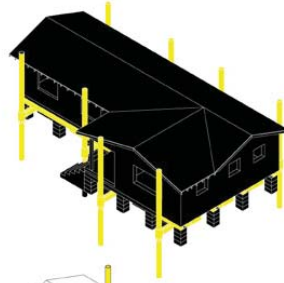
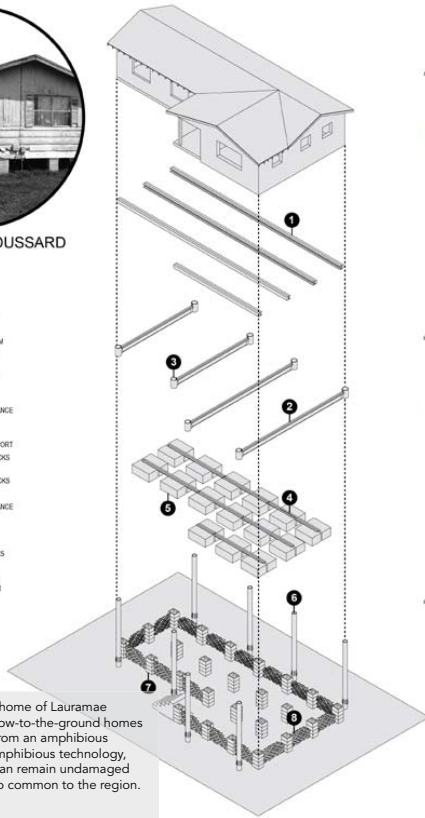
FLOATING HOPE



LAURAMAÉ BROUSSARD

PARTS LIST

- 1 WOOD SILL BEAM W/ C-CHANNEL
- 2 DOUBLE ANGLE 'T' BEAM
- 3 VERTICAL GUIDANCE SLEEVE
- 4 FRAME TO SUPPORT BUOYANCY BLOCKS
- 5 BUOYANCY BLOCKS
- 6 VERTICAL GUIDANCE POST
- 7 EXISTING MASONRY PIERS
- 8 WATER BORNE DEBRIS BARRIER



Practical Applications: The home of Lauramae Broussard is one of the six low-to-the-ground homes that would greatly benefit from an amphibious retrofit. By implementing amphibious technology, her home and belongings can remain undamaged during the floods that are so common to the region.